CONST

WEAR CHECK

OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	ABNORMAL
FLUID CONDITION	NORMAL

Machine Id
CATERPILLAR 972K RL-1520 (S/N Z4W00213)
Component
Hydraulic System
Fluid
TDH FLUID SAE 75W80 (38 GAL)

RECOMMENDATION

No corrective action is recommended at this time. Oil and filter change at the time of sampling has been noted. Resample at the next service interval to monitor.

WEAR

All component wear rates are normal.

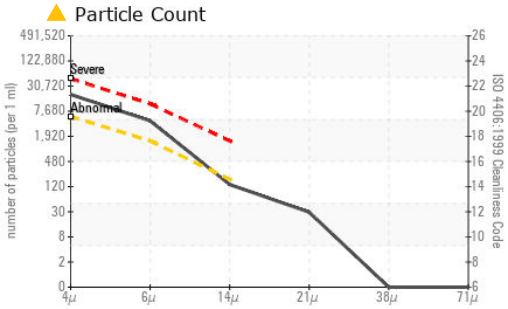
CONTAMINATION

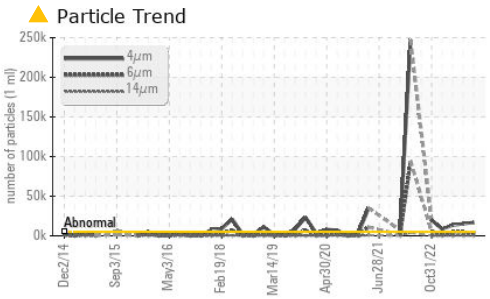
There is a high amount of silt (particulates < 14 microns in size) present in the oil.

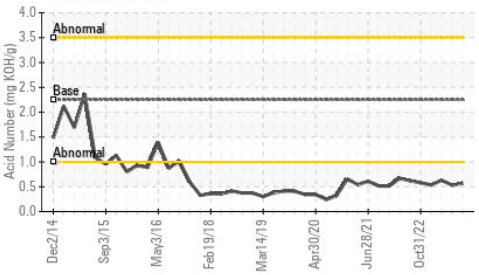
FLUID CONDITION

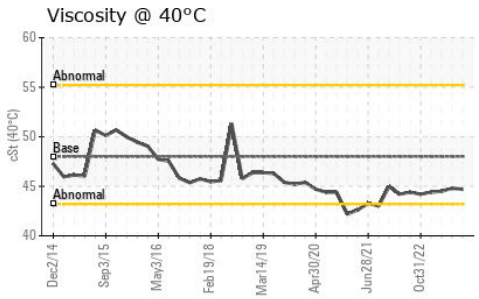
The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

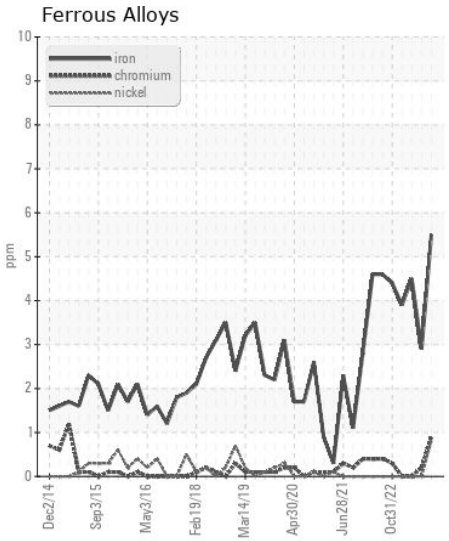
Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		WC0856131	WC0800542	WC0724580
Sample Date		Client Info		10 Apr 2024	27 Nov 2023	10 Jul 2023
Machine Age	hrs	Client Info		25683	25290	24380
Oil Age	hrs	Client Info		1500	910	2000
Filter Age	hrs	Client Info		500	500	584
Oil Changed		Client Info		Changed	Not Changd	Changed
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				ABNORMAL	ABNORMAL	ABNORMAL
Iron	ppm	ASTM D5185m	>20	6	3	4
Chromium	ppm	ASTM D5185m	>10	<1	<1	0
Nickel	ppm	ASTM D5185m	>10	<1	0	0
Titanium	ppm	ASTM D5185m		<1	<1	<1
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>10	2	2	2
Lead	ppm	ASTM D5185m	>10	1	0	0
Copper	ppm	ASTM D5185m	>75	3	2	3
Tin	ppm	ASTM D5185m	>10	1	0	0
Vanadium	ppm	ASTM D5185m		<1	0	<1
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Silicon	ppm	ASTM D5185m	>20	6	5	5
Potassium	ppm	ASTM D5185m	>20	3	2	<1
Water		WC Method	>0.1	NEG	NEG	NEG
Particles >4µm		ASTM D7647	>5000	▲ 16810	▲ 15262	▲ 13349
Particles >6µm		ASTM D7647	>1300	▲ 3936	▲ 4451	▲ 4499
Particles >14µm		ASTM D7647	>160	119	▲ 319	▲ 340
Particles >21µm		ASTM D7647	>40	26	▲ 77	▲ 87
Particles >38µm		ASTM D7647	>10	0	3	3
Particles >71µm		ASTM D7647	>3	0	0	0
Oil Cleanliness		ISO 4406 (c)	>19/17/14	▲ 21/19/14	▲ 21/19/15	▲ 21/19/16
Silt	scalar	*Visual	NONE	NONE	NONE	LIGHT
Debris	scalar	*Visual	NONE	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.1	NEG	NEG	NEG
Sodium	ppm	ASTM D5185m		<1	2	3
Boron	ppm	ASTM D5185m	10	21	18	21
Barium	ppm	ASTM D5185m	10	0	0	0
Molybdenum	ppm	ASTM D5185m	10	6	3	6
Manganese	ppm	ASTM D5185m		<1	<1	<1
Magnesium	ppm	ASTM D5185m	100	45	49	48
Calcium	ppm	ASTM D5185m	3500	984	941	712
Phosphorus	ppm	ASTM D5185m	1150	666	592	590
Zinc	ppm	ASTM D5185m	1150	730	769	753
Sulfur	ppm	ASTM D5185m	5000	2189	2034	1991
Acid Number (AN)	mg KOH/g	ASTM D8045	2.25	0.57	0.53	0.63
Visc @ 40°C	cSt	ASTM D445	48	44.7	44.8	44.5

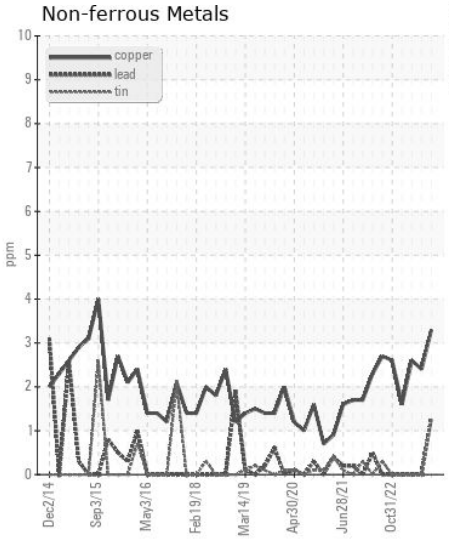


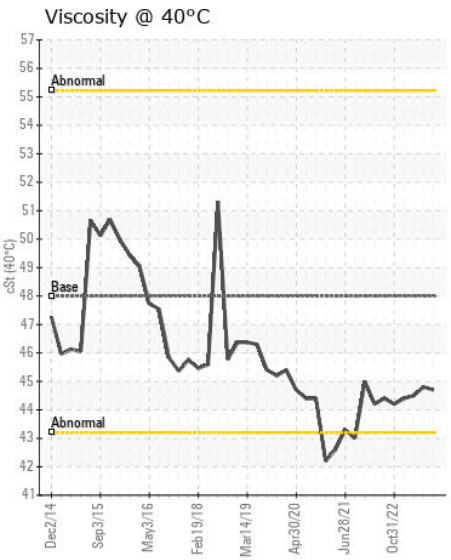


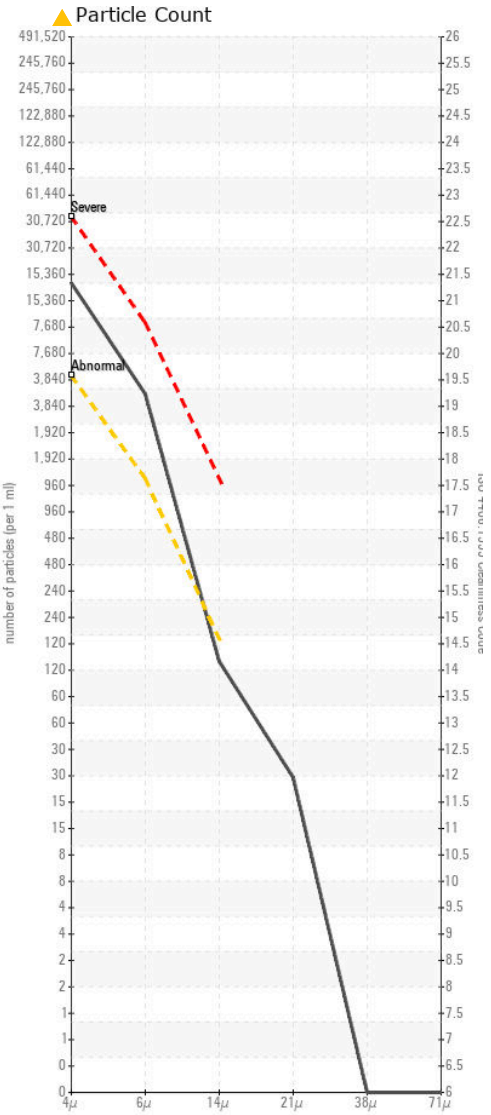


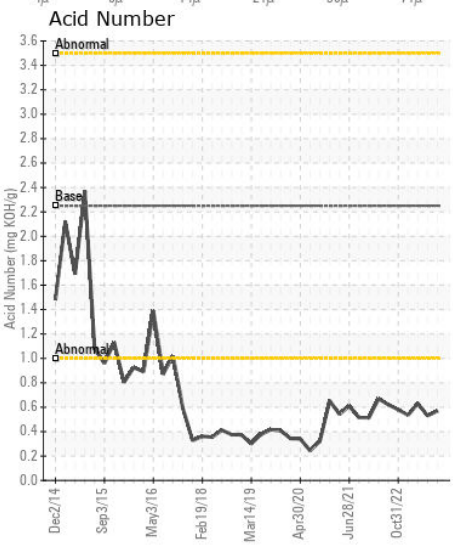












Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : WC0856131
Lab Number : 06147277
Unique Number : 10977355
Test Package : CONST

Received : 12 Apr 2024
Tested : 15 Apr 2024
Diagnosed : 16 Apr 2024 - Don Baldridge

To discuss this sample report, contact Customer Service at 1-800-237-1369.
** - Denotes test methods that are outside of the ISO 17025 scope of accreditation.*
Statements of conformity to specifications are based on the simple acceptance decision rule (JCGM 106:2012)

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